Amendments to the Claims

This listing of claims will replace all prior versions, and listings, of claims in the application:

AHMRT

Listing of Claims:

(currently amended) A method for controlling engine operation in a vehicle, the engine 1. coupled to an emission control device including at least platinum particles for converting emissions from the engine, the method comprising:

detecting a deceleration condition of the vehicle;

in response to said deceleration condition, having combustion in at least one cylinder, and adjusting fuel injection into the engine to maintain an exhaust mixture air-fuel ratio entering the emission control device to be lean, but less lean than a limit air-fuel ratio value, said limit airfuel ratio value being a lean air-fuel ratio limit determined as a function of exhaust temperature.

- (original) The method recited in Claim 1 further comprising, adjusting an exhaust valve 2. in an exhaust system of the engine to increase exhaust gas cooling.
- (original) The method recited in Claim 1 wherein said limit air-fuel ratio decreases as 3. temperature increases, at least in one operating region.
- (original) The method recited in Claim 3 wherein said exhaust temperature includes 4. temperature of the emission control device.

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(currently amended) The method recited in Claim 4 wherein the exhaust includes a 5. second emission control device is coupled upstream of said emission control device.

6-15. (cancelled)

(currently amended) A method for controlling engine operation in a vehicle, the engine 16. coupled to a first and second emission control device, the second emission control device including at least platinum particles for converting emissions from the engine, the method comprising:

detecting a deceleration condition of the vehicle;

determining temperature of [[the]] said second emission control device;

enabling fuel cut operation in at least one cylinder when said second device temperature is less than a first value during said detected deceleration condition;

disabling fuel cut operation in at least one cylinder when said second device temperature is greater than a second value; and

when said second device temperature is between said first value and said second value, limiting a lean engine air-fuel ratio to a lean limit value determined based on said second device temperature when an oxygen storage amount of said first emission control device has approached a storage capacity of said first emission control device, and enabling fuel cut operation or any lean air-fuel ratio when said oxygen storage amount of said first emission control device is below said storage capacity.

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(currently amended) A method for controlling engine operation in a vehicle, the engine 17. coupled to a first and second emission control device, the second emission control device including at least platinum particles for converting emissions from the engine, the method comprising:

detecting a deceleration condition of the vehicle;

determining temperature of [[the]] said second emission control device;

enabling fuel cut operation in at least one cylinder while said second device temperature is less than a first value during said detected deceleration condition; and

enabling fuel cut operation for only a preselected period when said second device temperature is greater than a second value.

- (original) The method recited in Claim 17 wherein said second value is equal to said first 18. value.
- (currently amended) The method recited in Claim 18 wherein said first value is based on 19. exhaust air-fuel ratio entering or in said second emission control device.
- (original) The method recited in Claim 17 wherein said preselected period include a time 20. period.
- (original) The method recited in Claim 17 wherein said preselected period include a 21. number of engine cycles.

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22. (new) A method for controlling engine operation in a vehicle, the engine coupled to an emission control device including at least platinum particles for converting emissions from the engine, the method comprising:

detecting a deceleration condition of the vehicle;

in response to said deceleration condition, adjusting fuel injection into the engine to maintain an exhaust mixture air-fuel ratio entering the emission control device to be lean, but less lean than a limit air-fuel ratio value, said limit air-fuel ratio value being a lean air-fuel ratio limit determined as a function of exhaust temperature, wherein said limit air-fuel ratio decreases as temperature increases, at least in one operating region, wherein said exhaust temperature includes temperature of the emission control device, wherein a second emission control device is coupled upstream of said emission control device wherein said limit air-fuel ratio for said downstream emission control device is based on an amount of oxygen storage of said upstream emission control device.

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